

of the name *Glyptosternum*, and every reason for retaining it in the generally accepted sense. For the species which differ from the type in having the skin covering the pectoral and pelvic spines smooth—not striated—the name *Glyptothorax* may be used by those who consider them worthy of generic or subgeneric distinction, Blyth's diagnosis being based on his new species *Gl. trilineatus*, which may be regarded as the type of *Glyptothorax*.

Mr. Hora has examined a fish from Tenasserim in the collection of the Indian Museum, which may or may not be one of Blyth's original specimens of *Exostoma berdmorei*. This fish is broken in pieces and not fit for investigation, but Mr. Hora thinks it may be a *Glyptothorax*. He therefore proposes to make *Exostoma* a synonym of *Glyptothorax*. A reference to Blyth's original description will leave no doubt that he had before him examples of a species congeneric with McClelland's *Gl. labiatum*. The description of the four separate patches of teeth, the lips united to form a sucker, the small gill-openings, the exceedingly slender dorsal spine, the long low adipose fin, and the smooth flat lower surface leave no doubt that *Exostoma berdmorei* is an *Exostoma* in the sense in which I used the name in 1905 (*Ann. & Mag. Nat. Hist.* (7) xv. p. 182), and nothing like a *Glyptothorax*.

LXVIII.—*The Fishes of the Family Icosteidæ.*

By C. TATE REGAN, M.A., F.R.S.

(Published by permission of the Trustees of the British Museum.)

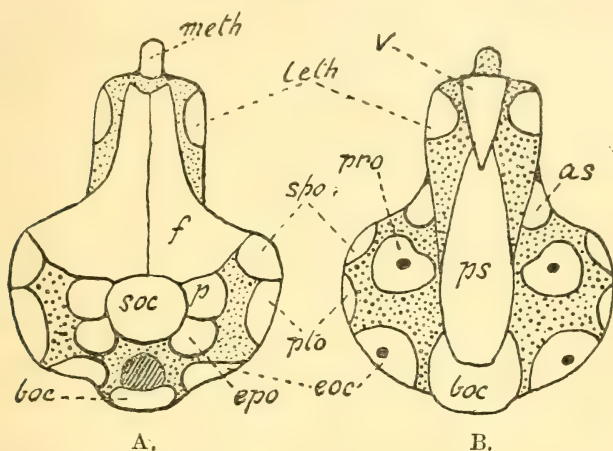
THE isolated family Icosteidæ comprises the monotypic genera *Icosteus* and *Acrotus*, from deep water off the Pacific coast of North America.

The family may be characterized as follows:—

Body ovate, strongly compressed, naked, or with scattered prickles. Mouth terminal, bordered above by the non-protractile præmaxillaries. Teeth in jaws small, pointed, uniserial; palate toothless. Gill-membranes separate; 4 gills; pseudobranchiæ present; 6 or 7 branchiostegals. No spinous fin-rays; dorsal and anal long, many-rayed; caudal peduncle slender and caudal fin fan-shaped; pectorals well up on sides, with subvertical curved base; pelvics, when present, 5-rayed, well behind pectorals. Air-bladder large,

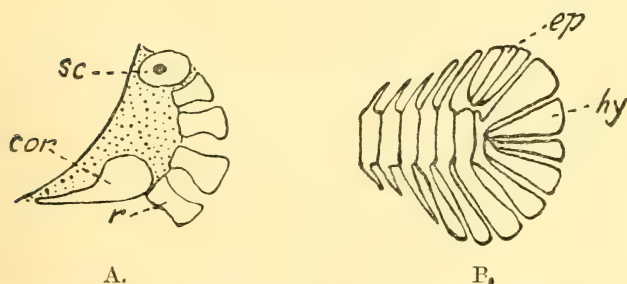
without duct. Skeleton weakly ossified, largely cartilaginous, soft, and flexible.

Fig. 1.

Skull of *Icosteus*, from above (A) and from below (B).

f, frontal; *p*, parietal; *meth*, mesethmoid; *leth*, lateral ethmoid; *soc*, supraoccipital; *boc*, basioccipital; *eoc*, exoccipital; *epo*, epiotic; *pto*, pterotic; *spo*, sphenotic; *pro*, prootic; *as*, alisphenoid; *ps*, parasphenoid; *v*, vomer.

Fig. 2.

*Icosteus enigmaticus*. Skeleton of pectoral (A) and caudal (B) fins.

sc, hypercoracoid (scapula); *cor*, hypocoracoid; *r*, radials;
ep, epurals; *hy*, hypurals.

I have studied the skeleton of an example of *Icosteus enigmaticus*, but the skull has been pushed out of shape,

so that the accompanying figures are to some extent diagrammatic. There appears to be a complete cartilaginous cranium, which is rather broad and somewhat depressed. The membrane-bones—parietals, frontals, mesethmoid, vomer, and parasphenoid—are thin. The cartilage-bones—basioccipital, supraoccipital, exoccipitals, epiotics, pterotics, sphenotics, prootics, alisphenoids, and lateral ethmoids—are for the most part separated from each other by cartilage. The slender palatine is attached to the anterior end of the vomer; the pterygoids, quadrate, etc., have no feature of special interest; the opercular bones are very thin, almost membranous.

The post-temporal is simple, attached to the epiotic; its lower fork is represented by a ligament. The coracoid ossifications are widely separated by cartilage, on which the four rather large radials are inserted. The small separate pelvic bones are remote from the pectoral arch.

The basalia of the dorsal and anal fins are not connected with the neural and hæmal spines.

The vertebral column comprises 70 vertebræ; the ribs are feeble and sessile; the hypurals have a radiating arrangement.

The exact systematic position of the *Icosteidae* is uncertain, but the great development of cartilage and the weakness of the bones is evidently secondary, and there is nothing in their organization to prevent the assumption that the *Icosteidae* represent a specialized and somewhat degenerate development of the *Perciform* type.

LXIX.—*The Classification of the Stomiatoïd Fishes.*

By C. TATE REGAN, M.A., F.R.S.

(Published by permission of the Trustees of the British Museum.)

THE Stomiatoïds are Teleostean Fishes of the order *Isospondyli* (or *Malacopterygii*); they are oceanic, some descending to considerable depths. They differ from the *Clupeoids* in possessing photophores, which are usually arranged in two series on each side of the lower part of the body. The dentigerous maxillary enters the gape and is firmly attached to the præmaxillary. The ribs are attached to short autogenous parapophyses which are inserted in pits